

**REMARKS**

Claims 1-20 remain in the application for consideration. In view of the following remarks, Applicant respectfully requests that the application be forwarded on to issuance.

**Office Communication**

Preliminarily, Applicant respectfully points out that Claims 18-20 are not included on page 1 of the Office's Communication (mailed 07/15/2004) titled "Office Action summary" under the "disposition of Claims" section. In addition, claims 18-20 are not included on page 2 titled "Detailed Action" under section numbered 2. Nevertheless, claims 18-20 are discussed in subsequent pages of the Office's communication. Accordingly, Applicant has proceeded under the assumption that the Office intended to include claims 18-20 in these portions and only inadvertently excluded them. Applicant requests that any necessary corrections to the record be made.

**§ 103 Rejections**

Claims 1-20 stand rejected under U.S.C. §103(a) as being unpatentable over U.S. Patent No. 6,639,943 to Radha et al. (hereinafter "Radha").

Before undertaking a discussion regarding the substance of the Office's rejections, the following discussion of the § 103 Standard is provided.

1        **The § 103 Standard**

2        To establish a prima facie case of obviousness, *three basic criteria must be*  
3 *met*. First, there must be some suggestion or motivation, either in the references  
4 themselves or in the knowledge generally available to one of ordinary skill in the  
5 art, to modify the reference or to combine reference teachings. *In re Jones*, 958  
6 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992); *In re Fine*, 837 F.2d 1071, 5  
7 USPQ2d 1596 (Fed. Cir. 1988). Second, there must be a reasonable expectation  
8 of success. *In re Merck & Co., Inc.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir.  
9 1986). Finally, the prior art reference (or references when combined) must teach  
10 or suggest all the claim limitations. *In re Royka*, 490 F.2d 981, 180 USPQ 580  
11 (CCPA 1974). The teaching or suggestion to make the claimed combination and  
12 the reasonable expectation of success *must* both be found in the prior art, not in  
13 applicant's disclosure. *In re Vaeck*, 947 F.2d 488, 20 USPQ2d 1439 (Fed. Cir.  
14 1991).

15        Hence, when patentability turns on the question of obviousness, the search  
16 for and analysis of the prior art includes evidence relevant to the finding of  
17 whether there is a teaching, motivation, or suggestion to select and combine the  
18 references relied on as evidence of obviousness. See, e.g., *McGinley v. Franklin*  
19 *Sports, Inc.*, 262 F.3d 1339, 1351-52, 60 USPQ2d 1001, 1008 (Fed. Cir. 2001)  
20 ("the central question is whether there is reason to combine [the] references," a  
21 question of fact drawing on the Graham factors). The mere fact that references *can*  
22 be combined or modified does not render the resultant combination obvious unless  
23 the prior art also suggests the desirability of the combination. *In re Mills*, 916 F.2d  
24 680, 16 USPQ2d 1430 (Fed. Cir. 1990). "To support the conclusion that the  
25 claimed invention is directed to obvious subject matter, either the references must

1 expressly or impliedly suggest the claimed invention or *the examiner must*  
2 *present a convincing line of reasoning as to why the artisan would have found*  
3 *the claimed invention to have been obvious in light of the teachings of the*  
4 *references.* *Ex parte Clapp*, 227 USPQ 972, 973 (Bd.Pat. App. & Inter.  
5 1985)(emphais added).

6 Chapter 2100 of the MPEP provides further instruction as follows: "With  
7 regard to rejections under 35 U.S.C. 103, the examiner must provide evidence  
8 which as a whole shows that the legal determination sought to be proved (i.e., the  
9 reference teachings establish a *prima facie* case of obviousness) is more probable  
10 than not." *See* MPEP 2142.

11 "The factual inquiry whether to combine references must be thorough and  
12 searching." *Id.* It must be based on objective evidence of record. This precedent  
13 has been reinforced in myriad decisions, and cannot be dispensed with. See, e.g.,  
14 *Brown & Williamson Tobacco Corp. v. Philip Morris Inc.*, 229 F.3d 1120, 1124-  
15 25, 56 USPQ2d 1456, 1459 (Fed. Cir. 2000) ("a showing of a suggestion,  
16 teaching, or motivation to combine the prior art references is an 'essential  
17 component of an obviousness holding'" (quoting *C.R. Bard, Inc., v. M3 Systems,*  
18 *Inc.*, 157 F.3d 1340, 1352, 48 USPQ2d 1225, 1232 (Fed. Cir. 1998)); *In re*  
19 *Dembiczak*, 175 F.3d 994, 999, 50 USPQ2d 1614, 1617 (Fed. Cir. 1999) ("*Our*  
20 *case law makes clear that the best defense against the subtle but powerful*  
21 *attraction of a hindsight-based obviousness analysis is rigorous application of*  
22 *the requirement for a showing of the teaching or motivation to combine prior art*  
23 *references.*"); *In re Dance*, 160 F.3d 1339, 1343, 48 USPQ2d 1635, 1637 (Fed.  
24 Cir. 1998) (there must be some motivation, suggestion, or teaching of the  
25 desirability of making the specific combination that was made by the applicant); *In*

1 *re Fine*, 837 F.2d 1071, 1075, 5 USPQ2d 1596, 1600 (Fed. Cir. 1988) ("teachings  
2 of references can be combined only if there is some suggestion or incentive to do  
3 so.") (emphasis in original) (quoting *ACS Hosp. Sys., Inc. v. Montefiore Hosp.*,  
4 732 F.2d 1572, 1577, 221 USPQ 929, 933 (Fed. Cir. 1984)); *In re Fritch*, 23  
5 USPQ2d 1780, 1784 (Fed. Cir. 1992) ("It is impermissible to use the claimed  
6 invention as an instruction manual or 'template' to piece together the teachings  
7 of the prior art so that the claimed invention is rendered obvious. [O]ne cannot  
8 use hindsight reconstruction to pick and choose among isolated disclosures in  
9 the prior art to deprecate the claimed invention.") (quoting *In Re Fine*, 837 F.2d  
10 1071, 1075, 5 USPQ2d 1596, 1600 (Fed. Cir. 1988)).

11 The need for specificity pervades this authority. See, e.g., *In re Kotzab*,  
12 217 F.3d 1365, 1371, 55 USPQ2d 1313, 1317 (Fed. Cir. 2000) ("particular  
13 findings must be made as to the reason the skilled artisan, with no knowledge of  
14 the claimed invention, would have selected these components for combination in  
15 the manner claimed").

16 Applicant disagrees with the Office's obviousness rejections and  
17 respectfully submits that the Office has not made out a *prima facie* case of  
18 obviousness. Accordingly, Applicant respectfully requests withdrawal of these  
19 rejections.

### 20 Claims Rejected over Radha under § 103

21 Claim 1 recites method of processing media content, the method  
22 comprising:  
23  
24  
25

- generating a motion compensated prediction of a region of media content;
- receiving an indication of whether there are first and second quantities of residual samples remaining for refining the prediction, on a per-region basis; and
- adding of the first quantity of residual samples to the prediction to generate a refined prediction value, when so indicated; and
- subtracting the second quantity of residual samples from the refined prediction value to generate a final representation, when so indicated.

In making out the rejection of this claim, the Office argues that:

Although Radha fails to show the subtraction as claimed, Radha *could show* subtraction of the data *if* the residual samples were negative. The Examiner notes that the operations of adding a negative and subtracting yield equivalent outputs. Therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to implement adding negative numbers or subtracting in order to obtain an apparatus that becomes more diverse by being able to accommodate a wider range of numbers (positive and negative). (emphasis added)

Applicant agrees that Radha *fails to show the subtraction as claimed*.

Applicant disagrees with the Office's obviousness rejection and reminds the Office that *the prior art reference* must teach or suggest all the claim limitations. In addition, Applicant points out that there is no *suggestion or motivation* to subtract residual samples, nor any reasonable *expectation of success* from doing so. Hence, for at least this reason, the Office has failed to establish a *prima facie* case of obviousness.

Applicant respectfully submits that the Office has clearly used hindsight reconstruction by speculating on what Radha *could*, but *does not* show - an act that has been specifically proscribed by the Federal Circuit. In addition, Applicant

1 respectfully submits that what Radha *could* is completely irrelevant to a legally  
2 proper analysis under §103. Applicant can find no guidance in the line of cases set  
3 out above that indicates that what a reference *could* show is relevant

4 Clearly, the Office has relied on teaching found in the *Applicant's*  
5 disclosure regarding this claim element to support its argument. Applicant  
6 reminds the Office that teachings or suggestions to make the claimed combination  
7 and the reasonable expectation of success must both be found in the prior art, *not*  
8 *in the applicant's disclosure*.

9 Further, it is unclear what the Office means when it states "the operations  
10 of adding a negative and subtracting yield equivalent outputs" has to do with  
11 *subtracting the second quantity of residual samples from the refined prediction*  
12 *value to generate a final representation*. Applicant submits that this line of  
13 reasoning is not clearly explained as required by MPEP 706.02(j).

14 In addition, Applicant submits the subtraction, as claimed, would not have  
15 been common knowledge. If the Office is taking official notice that doing so  
16 would have been common knowledge, then it does so without the support of any  
17 evidence in the record. Applicant traverses any such assertion by the Office, *if*  
18 *made*, and specifically requests that documentary evidence, pursuant to MPEP  
19 2144.03(c) and 37 CFR 1.104(c)(2), be supplied to support the Office's  
20 contention.

21 In view of the above discussion, the Office has not established a *prima*  
22 *facie* case of obviousness. Hence, for at least these reasons, this claim is  
23 allowable.

24 Claims 2-9 depend from claim 1 and are allowable as depending from an  
25 allowable base claim. These claims are also allowable for their own recited

1 features which, in combination with those recited in claim 1, are neither disclosed  
2 nor suggested in the references of record, either singly or in combination with one  
3 another.

4 **Claim 10** recites a medium comprising a plurality of executable  
5 instructions which, when executed, implement a decoder of media content to  
6 generate a motion compensated prediction of at least a region of media content, to  
7 receive an indication of one or more sets of samples of residual information to  
8 further refine the prediction, and to add a first set of such samples to the prediction  
9 to generate a modified prediction, if indicated, and to subtract a second set of such  
10 samples from the modified prediction to generate a final motion compensated  
11 prediction of the region, if indicated.

12 In making out the rejection of this claim, the Office argues that it would  
13 have been obvious to one having ordinary skill in the art at the time the invention  
14 was made to subtract a second set of such samples from the modified prediction as  
15 recited in this claim. Applicant disagrees and traverses the rejection.

16 As discussed above and for all of the reasons set forth above, the Office has  
17 not established a *prima facie* case of obviousness. For at least these reasons, this  
18 claim is allowable.

19 **Claims 11-14** depend from claim 10 and are allowable as depending from  
20 an allowable base claim. These claims are also allowable for their own recited  
21 features which, in combination with those recited in claim 10, are neither disclosed  
22 nor suggested in the references of record, either singly or in combination with one  
23 another.

24 **Claim 15** recites a computing system comprising:  
25

- a decoder application to receive a region of media content and control generation of decoded media content; and
- an application program interface (API), communicatively coupling the decoder application with a hardware accelerator, wherein if the API receives an indication of one or more sets of residual samples, the first set of samples is added to a motion compensated prediction to generate a refinement of a prediction value, when so indicated, and a second set of samples is subtracted from the refined prediction value to generate a final representation, when so indicated.

In making out the rejection of this claim, the Office argues that the decoder disclosed in Radha comprises an "application program interface". Applicant disagrees with the Office's obviousness rejection and reminds the Office that *the prior art reference* must teach or suggest all the claim limitations. Specifically, the Office cites to column 9, lines 57-59, stating: "wherein the interface is the application that runs to obtain the user input". However, this portion of Radha cited by the Office *does not mention an "application program interface" or "API"*. Column 9, lines 57-61 are reproduced below for the Office's convenience:

This determination also can be based on the available bandwidth and/or the user input 30. After this determination is performed, the video rate controller 18 outputs images to the variable-bandwidth network 43 as a BL stream, temporal EL stream and FGS EL stream.

In fact, Applicant was unable to find a reference to any application program interface (or API) communicatively coupling a decoder application with a hardware accelerator anywhere in the Radha reference.

Perhaps more importantly, and as pointed out above, the Office has reached their conclusion, with respect to the recited second set of samples being subtracted from the refined prediction, based upon legally inappropriate and unsupported reasoning.



As the subject matter of this claim is neither taught nor suggested, the Office has not established a *prima facie* case of obviousness. For at least these reasons, this claim is allowable

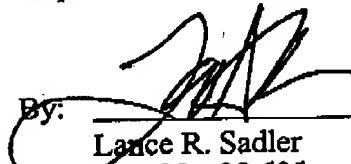
Claims 16-20 depend from claim 15 and are allowable as depending from an allowable base claim. These claims are also allowable for their own recited features which, in combination with those recited in claim 15, are neither disclosed nor suggested in the references of record, either singly or in combination with one another.

**Conclusion**

All of the claims are in condition for allowance. Accordingly, Applicant requests a Notice of Allowability be issued forthwith. If the Office's next anticipated action is to be anything other than issuance of a Notice of Allowability, Applicant respectfully requests a telephone call for the purpose of scheduling an interview.

Respectfully Submitted,

Dated: 9/23/04

By:   
Lance R. Sadler  
Reg. No. 38,605  
(509) 324-9256